RESEARCH PLAN PROPOSAL

An Analysis of Financial and Environmental Performance of selected Cement Companies in India

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TABLE OF CONTENTS

SERIAL NO.	TOPIC	PAGE NO.
1.	**INTRODUCTION**	3-6
2.	**REVIEW OF LITERATURE**	6
3.	**OVERVIEW OF RESEARCH PAPERS**	6-29
4.	**RESEARCH GAP**	30
5.	**BOOK REVIEW**	31-41
6.	**STATEMENT OF PROBLEM**	42
7.	**SCOPE OF THE STUDY**	42
8.	**RELEVANCE OF THE STUDY**	42
9.	**RESEARCH QUESTIONS**	42
10.	**OBJECTIVES OF THE STUDY**	43
11.	**HYPOTHESIS OF THE STUDY**	43
12.	**PARAMETERS AND VARIABLES**	44
13.	**RESEARCH METHODOLOGY**	44-47
14.	**LIMITATIONS OF THE STUDY**	48
15.	**SCHEME OF CHAPTERIZATION**	48-49
16.	**REFERENCES**	50-52

INTRODUCTION

Rapid population explosion and rising living standards among the earth's inhabitants are putting an unendurable strain on nature and environment. The word Environment is derived from French word "Environ" which means "surrounding". Environment includes water, air and land and the interrelationships which exists among and between water, air and land and human beings and other living creatures such as plants, animals and microorganisms.Environmental pollution remains a serious issue in the developing world, affecting the lives of billions of people, reducing their life expectancy, and damaging children's growth and development. The World Health Organization (WHO) estimates that 25% of all deaths in the developing world can be directly attributed to environmental factors. The problem of pollution, and its corresponding adverse ecological impacts have been aggravated due to increasing industrial and other developmental activities. India, among other developing nations of the world, is facing the challenge of industrial pollution at an alarming rate. Environmental degradation has increased urgency for a transition to a low- carbon, climate resilient and resource-efficient global economy. Environmental sustainability is an area of increasing concern for society, governments, corporations and policy makers worldwide. People are more concerned about the environmental factors because of increasing pollution, decline in water resources and other reasons. Because of dirty water sources and air pollution, many people are dying day by day around the world.

It is essential that the firms should give importance to environmental issues and should transform their structures from the "brown economy", that have low sensitivity and profit-centric, to the model of 'green economy', that give importance to environmental sustainability (Pointing, 2012; Sukhdev, 2013).Some firms start to give importance to environmental issues and these firms' try to reduce gas emissions and to mitigate the climate change risk. The firms that take ISO 14000 certificate and/or issue environmental reports are increasing recent years. Decreasing gas emissions, clean technology, protecting environment are becoming more important in global business environment. Moreover being sensitive to environmental issues becomes a hallmark for global business environment.

Firms usually are double minded about investing in environmental issues because of the relationship between financial performances and investing in environmental issues. Some firms think that environmental efforts give competitive advantage by cost savings (using less energy, recycling of wastes etc.) and by attaining customer satisfaction, employee loyalty and by gaining positive image reputation and by complying with regulations (Lynes&Drdge, 2006; Porter Van der Linde, 1995). On the other hand, if the firm invest in poor environmental efforts, the financial performance will be affected negatively because of inefficiency and useless investments (Reinhardt, Porter Van der Linde, 1995). Here financial performance is defined as

the act of performing financial activity. In broader sense, financial performance refers to the degree to which financial objectives being or has been accomplished. It is the process of measuring the results of a firm's policies and operations in monetary terms whereas environmental performance is defined as the measurable outcome of an organization's ability to meet environmental objectives and targets set forth in the organization's environmental plan or policy. Hence in this study it is aimed to analyze the relationship of financial performance and environmental performance of the companies operating in India.

POLLUTING INDUSTRIES IN INDIA-

The Central Pollution Control Board (CPCB) in pursuance of its mandate, formulates national programmes for prevention and control of pollution. These include nationwide monitoring network, laying down national standards for ambient water and air quality, source-specific Minimal National Standards (MINAS) for effluents and emissions, and action plans for critically polluted areas and highly polluting categories of industries.In regard to polluting industries, the State Pollution Control Boards (SPCBs) in State and the Pollution Control Committees (PCCs) in UT Administration enforce the standards laid down for various types of industry. For a nation-wide drive to control industrial pollution, the Central Pollution Control Board enlisted 17 categories of highly polluting industries and grossly polluting industries discharging their effluents into the rivers and lakes.

List of 17 categories of highly polluting industries

1. Aluminium smelting
2. Basic drugs and pharmaceuticals manufacturing
3. Caustic soda
4. Cement (200 tonnes per day (TPD) and above)
5. Copper smelting
6. Dyes and dye intermediate
7. Fermentation (distillery)
8. Fertilizer
9. Integrated iron and steel
10. Leather processing including tanneries
11. Oil refinery
12. Pesticide formulation and manufacturing
13. Pulp and paper (30 TPD and above)
14. Petrochemical
15. Sugar
16. Thermal power
17. Zinc smelting

Out of these 17 polluting industries cement industry has been chosen for the purpose of this study.

CEMENT INDUSTRY

It is impossible to envisage a modern life without cement. Cement is an extremely important construction material used for housing and infrastructure development and a key to economic growth. Cement demand is directly associated to economic growth and many growing economies are striving for rapid infrastructure development which underlines the tremendous growth in cement production.The cement industry plays a major role in improving living standard all over the world by creating direct employment and providing multiple cascading economic benefits to associated industries. Despite its popularity and profitability, the cement industry faces many challenges due to environmental concerns and sustainability issues.

IMPACT OF CEMENT INDUSTRY ON ENVIRONMENT

The production of cement releases **greenhouse gas emissions** both directly and indirectly: the heating of limestone releases CO_2 directly, while the burning of fossil fuels to heat the kiln indirectly results in CO_2emissions .

The direct emissions of cement occur through a chemical process called *calcination*. Calcination occurs when limestone, which is made of calcium carbonate, is heated, breaking down into calcium oxide and CO_2. This process accounts for ~50 percent of all emissions from cement production.

Indirect emissions are produced by burning fossil fuels to heat the kiln. Kilns are usually heated by coal, natural gas, or oil, and the combustion of these fuels produces additional CO_2 emissions, just as they would in producing electricity. This represents around 40 percent of cement emissions. Finally, the electricity used to power additional plant machinery, and the final transportation of cement, represents another source of indirect emissions and account for 5-10 percent of the industry's emissions.

JUSTIFICATION OF THE STUDY

The production of cement involves the consumption of large quantities of raw materials, energy, and heat. Cement production also results in the release of a significant amount of solid waste materials and gaseous emissions. The manufacturing process is very complex, involving a large number of materials (with varying material properties), pyroprocessing techniques (e.g., wet and dry kiln, preheating, recirculation), and fuel sources (e.g., coal, fuel oil, natural gas, tires, hazardous wastes, petroleum coke). The cement manufacturing process produces millions of tons of the waste product cement kiln dust each year contributing to respiratory and pollution health risks. Cement is at the centre of the global climate change debate because its production is responsible for about 7% of total global carbon dioxide (CO2) emissions.

INDIAN CEMENT INDUSTRY

India is the second largest producer of cement in the world.No wonder, India's cement industry is a vital part of its economy, providing employment to more than a million people, directly or indirectly. Ever since it was deregulated in 1982, the Indian cement industry has attracted huge investments, both from Indian as well as foreign investors.India has a lot of potential for development in the infrastructure and construction sector and the cement sector is expected to largely benefit from it.

Top cement companies in India included in the study are UltraTech Cement, Shree Cement, Ambuja Cement, ACC Cement

REVIEW OF LITERATURE

A literature review is the effective evaluation of selected documents on a research topic.The review should describe, summarise, evaluate and clarify this literature.

Purpose of Literature Review

- Provide a context for the research.
- Justify the research.
- Ensure the research hasn't been done before.
- Show where the research fits into the existing body of knowledge.
- Enable the researcher to learn from previous theory on the subject.
- Illustrate how the subject has been studied previously.
- Highlight flaws in previous research.
- Outline gaps in previous research .
- Show that the work is adding to the understanding and knowledge of the field.
- Help refine, refocus or even change the topic.

Overview of research papers

S NO.	Year	Paper Title	National/International	Citation
1.	2018	The effect of environmental performance anddisclosure on financial performance	International	1
2.	2018	Environmental and Financial Performance. Is there a win-win or a win-losssituation? Evidence from the Greek manufacturing	International	5
3.	2017	Analyzing the Effect of Corporate EnvironmentalPerformance on Corporate Financial Performance in Developed and Developing Countries	International	15
4.	2017	A Study on the Financial Performance Evaluation of Punjab National Bank	International	147
5.	2016	Financial Analysis of the selected company	International	6
6.	2016	Financial Performance of Top 20 Airlines	International	6
7.	2015	ESG and financial performance: aggregated evidence from more than 2000 empirical studies.	International	237
8.	2015	The mediating effect of financial performance on the relationship between social responsibility and ownership structure	International	11

9.	2015	Analysis of Financial Performance of Banks in India	National	21
10.	2015	A Comparative Study on Financial Performance of Public Sector Banks in India: An Analysis on Camel Model	National	8
11.	2014	Financial performance evaluation and bankruptcy prediction (failure)1	International	13
12.	2014	A study on Financial Performance of Ashok Leyland Limited at Chennai	International	19
13.	2014	Financial Statements Analysis - Measurement of Performance and Profitability: Applied Study of Baghdad Soft-Drink Industry	National	11
14.	2014	The financial performance of an innovative megaproject	International	2
15.	2014	An Analysis of the Financial Performance of National Bank Limited Using Financial Ratio	International	14
16.	2014	A Study on the Financial Performance Efficiency of Selected Cement Industries in India	International	3
17.	2013	Triangulating environmental performance: What do corporate social responsibility ratingsreally capture?	International	173
18.	2012	How to understand and measure environmental sustainability:	International	594

		Indicators and targets		
19.	2012	A Study of Financial Performance: A Comparative analysis of SBI and ICICI bank	International	32
20.	2011	Is the tail wagging the dog?An empirical analysis of corporate carbon footprints and financial performance	International	37
21.	2010	Financial performance of microfinance institutions of India	International	37
22.	2008	Environmental performance indicators:An empirical study of Canadian manufacturing firms	International	269
23.	2001	Does it Really Pay to be Green? An Empirical Study of Firm Environmental and Financial Performance	International	1124
24.	2000	Development of environmental performance indicators for textileprocess and product	International	126

ARTICLES REVIEWED -TABLE

S no.	Title of Research paper	Year	Publication Details	Authors	Methodology	Conclusion	Observation
1.	The effect of environ mental performa	2018	Internationa l Journ al of	Lindri anasar i, Hanin un,	Purposive sampling method is used to gather the data of the manufacturing	The study result shows that environmental performance	The amount of observation data is only 108 companies Financial

	nce and disclosure on financial performance		Economics, Business and Entrepreneurship	Angrita Denziana	companies listed on the Indonesia Stock Exchange Multiple linear regressions are used as the analysis method, and type of the data is secondary by using the documentation method.	and environmental disclosure positively significantly affect financial performance	performance is just measured by two proxies which are ROA and ROE, while there are other types of ownership structures. As well as environmental performance which only uses PROPER with five categories, there are other types of measurements
2.	Environmental and Financial Performance. Is there a win-win or a win-loss situation ? Evidence from the Greek manufacturing	2018	Journal of Cleaner Production	Ilias Alexopoulos, Kostas Kounetas, Dimitris Tzelepis	Environmental performance is measured according to accounting data following the Eco Management and Auditing Scheme guidelines and ISO certification. Return on assets and return on sales ratios are used as indicators offinancial performance. Correlation and Regression analysis is conducted.	Firms with superior financial performance seem to achieve a better environmental performance. At the same time, firm specific and market characteristics significantly affect this relationship. These findings provide evidence that	The limitations of the research paper is the narrow scope of its sample exclusively from a European country and the way environmental reporting is measured and its reliance on a specific conceptual framework. Therefore, the findings are context

						governmental and corporate actions are necessary in order to lead to a more sustainable corporate performance in the long run.	specific and may not be applicable in a wider context.
3.	Analyzing the Effect of Corporate Environmental Performance on Corporate Financial Performance in Developed and Developing Countries	2017	Sustainability Journal	Sergio Manrique ID and Carmen-Pilar Martí-Ballester	To test the hypotheses, a database of large firms in different developed and developing countries around the world from 2008 to 2015, covering a long-term period is used. The environmental data were extracted from ASSET4 database, and the financial and accounting data fromWorldscope database, both DataStream databases (by Thomson Reuters).Correlatio and Regression analysis is conducted.	The results obtained show that the adoption of environmental practices significantly and positively affects the corporate financial performance in developed and developing countries. However, this effect is stronger for firms located in developing countries than those located in developed countries.	This paper does not take into account where firms' subsidiaries are located, which could influence the relationship studied. The period analyzed corresponds to a global economic crisis period hence the findings cannot be generalised to all periods. The approach to corporate environmental performance is based on a robust and well-treated score, which, however, may have limitations in its scope and measurement

							methodology. Finally, this paper only takes into account large firms, and therefore, the results obtained cannot be extended to small and medium firms
4.	A Study on the Financial Performance Evaluation of Punjab National Bank	2017	International Journal of Business and Management Invention	Maj Syed Mohd Mustafa, Dr. Mohd Taqi	**Data:** Secondary Data **Sample**: For five years i.e. 2011-12 to 2015-16 **Test:** Ratios, descriptive statistics and regression analysis	The financial viability of the banking system is certainly essential; not only to instil public confidence but also to make banks capable of discharging their social responsibilities.	The bank must improve its credit deposit proportion. The bank should focus on generating non-interest income. Introducing innovative branch administration.
5.	Financial Analysis of the selected company	2016	Slovak University of Technology in Bratislava , Intern	Dušan Baran, Andrej Pastyr, Daniela Baranova	Data: Secondary Data Sample: Time period of five years is taken i.e. from 2009-2014 Test: Golden statistic rule applied and scientific methods used	Financial-economic analysis focused on the business subject's ratio, indicators of activity, profitability, liquidity and indebtedness.	Financial analysis of this research paper is limited to practical use of subject's experience in the business.

			ationa l Journ al Baran ova				
6.	Financial Performa nce of Top 20 Airlines	2016	Proce dia ,Socia l and Behav ioral Scien ces	SuatT eker, Dilek Teker, Ayseg ul Guner	This research paper proposes a hormonic index to establish a unique way to measure comprehensive performance of airlines. The performance which is measured by four fundamental basis namely; profitability, operating, liquidity and efficiency.	The financial performance of airlines influences short and long term company decisions as well as shapes strategic planning. Hence, a better comprehensive financial performance measurement may be employed in strategic planning of airlines.	There are several airlines operating in the world but this study has taken only top 20 airlines
7.	ESG and financial performa nce: aggregat ed evidence from more than 2000 empirical studies.	2015	Journ al of Sustai nable Finan ce & Invest ment	Gunn ar Friede , Timo Busch & Alexa nder Basse n	For analysis, only academic studies – regardless if they are working papers, published journal papers, or written for a commercial audience – were considered. Review papers that did not provide	The results show that the business case for ESG investing is empirically very well founded. Roughly 90% of studies find a nonnegative ESG–CFP relation. More	It is essential to better understand the interaction of different ESG criteria in portfolios and the relevance of specific ESG sub-criteria for CFP. These insights will shed further

					quantitative summaries of their findings were not included in sample.Vote count analysis and meta analysis is conducted.	importantly, the large majority of studies reports positive findings. It is highlighted that the positive ESG impact on CFP appears stable over time.	light on the ESG determinants for long-term positive performance impacts.
8.	The mediating effect of financial performance on the relationship between social responsibility and ownership structure	2015	Journal of Accounting, Finance and Auditing studies.	Hayam Wahba,Khaled Elsayed	Data: Secondary Data Sample: For the year 2007 to 2010 Test: Panel data regression, ANOVA and Kruskal Wallis Test	Financial performance plays an important mediating role in the relationship between social responsibility and institutional investors	Future studies are invited to investigate the mediating effect of financial performance on the relationship between social responsibility and institutional investors in other contexts or countries
9.	Analysis of Financial Performance of Banks in India	2015	National Journal, Journal of Symbiosis Centr	Jeevan Jayant Nagarkar	Data: Secondary Data Sample: Study of 15banks taken under consideration Test: T test applied	The objective of government to create bigger national level banks by merging smaller banks is justified by this study	Banks are better if they depend on deposit money rather than borrowed money for disbursing advances.

			e for Management Studies				
10.	A Comparative Study on Financial Performance of Public Sector Banks in India: An Analysis on Camel Model	2015	Munich Personal RePEc Archive	Kishore Meghani,Hari Krishna Karri, Bharti Meghani Mishra	Data: Secondary Data Sample: Five year from 2010-2014 Test:CAMEL Model and t test	Bank of Baroda is the best bank in the selected public sector banks.Transparency and good governance would work as principal guiding force in present scenario.	The study depends upon the accuracy, reliability, and quality of secondary data source. The published data is not uniform and not properly disclosed by the banks.
11.	Financial performance evaluation and bankruptcy prediction (failure)	2014	Arab Economics and Business Journal	Dr.TalalA., Dr. Jared S.Soileau	Data:SecondaryData Sample: The data of six companies for the period 1998-2011 Test:t test	Liquidity via financial indicators helps to provide early warning of increased risk of financial failure.	The comprehensive performance models used in the evaluation process of these companies requires both financial and non-financial measures to complement each other.
12.	A study on Financial	2014	IOSR Journal of	R. Idhayajothi,	Data: Secondary Data Sample: Data of 5	The financial performance is fair. It has	The company should get the goodwill from

	Performance of Ashok Leyland Limited at Chennai		Business and Management, National Journal	Dr. O.T.V. Latasari,N. Manjula,R. malini ,A. Mehraj Banu	years taken Test: Ratio analysis, Common -size statement, Comparative statement and Trend analysis done.	been maintaining good financial performance and further it can improve if the company concentrates on its operating, Administrative and selling expenses and by reducing expenses.	the creditors so as to enjoy the credit worthiness.
13.	Financial Statements Analysis - Measurement of Performance and Profitability: Applied Study of Baghdad Soft-Drink Industry	2014	Research Journal of Finance and Accounting	Dr. Ayad Shaker Sultan	Data: Secondary data Sample: Data from June 2007 to June 2009 is collected. Test: Profit Margin (PM), Return on Assets (ROA), Return on Equity (ROE), Capital turnover ratio and Expense ratio are analysed	Baghdad Soft-Drinks Industry will recover from the inconvenience evidenced in its financial Statements and might be able to gain a handsome profits to its shareholders and outstanding performance in the years ahead.	The available data and many of the analytical techniques generally used are based on financial accounting and its special conventions, which by their nature don't necessarily reflect current and future performance.
14.	The financial performance of an innovative	2014	International Journal , Elsevi	Ana I. Irimia - Diéguez, Juan	Data: Secondary Data used. Sample: the effective tax rate from annual accounts for years	High leverage of the project has generated a return for shareholders far superior to	The financial structure of the megaproject may challenge this theory, by linking the debt

	megaproject		er	Bernal González-Villegas, M Dolores Oliver-Alfonso	2003 to 2011 is taken Test: Internal rate of return, Weighted Average cost of capital, cash flow, Net present value and Initial investment analysed.	that of the project	ratio to the negotiation of the different interests of the parties involved
15.	An Analysis of the Financial Performance of National Bank Limited Using Financial Ratio	2014	Journal of Behavioural Economics, Finance, Entrepreneurship, Accounting and Transport	Md Aminul Islam	Data: Secondary Data Sample: data of 2008-2014 is taken. Test: Paired t test, FRA method, ROA, ROE applied in this study	NBL (National Bank Limited) have a strong position in the competitive market. It is among one of the fastest growing Bank	The Financial Position of NBL is satisfactory compare to other commercial bank but has some problems. There have also some problems in balance sheet area.
16.	A Study on the Financial Performance Efficiency of Selected Cement	2014	International Journal of Emerging Engineering	T.N.Geetha, S.Ramasamy	The secondary data used in the study were collected for a period from 2001-2002 to 2012-13. Ratio Analysis and Compound Aggregate	Income from sales is the most Proficient expression than the other variables followed by interest income. There	The study is limited to seventeen large sized cement companies only. The results of the study may not be generalized for

	Industries in India		Research and Technology		Growth rate (CAGR) are applied.	is an improvement in the performance efficiency of the Indian cement Industries.	all the cement industries in India. The source of data is secondary in nature, so authentication is not possible
17.	Triangulating environmental performance: What do corporate social responsibility ratings really capture?	2013	Academy of Management Perspectives	Dror Etzion ,Nicholas Nairn-Birch	It examine the environmental evaluations of more than 200 U.S. firms as assessed by KLD Research and Analytics, Trucost, and Sustainable Asset Management (SAM) from 2004 through 2007. 2.Two-dimensional view of social and environmental ratings that distinguishes between processes and outcomes is undertaken. 3.Correlation analysis,Regression analysis is conducted.	Study has attempted to identify a useful balance between the competing needs for robustness and simplicity by assessing the commonality and distinctiveness of measures of environmental performance generated by three large rating organizations, each of which utilizes a distinct approach	It has been observed that that combining the different constructs that constitute environmental performance into a single index might be misrepresentative of the dimensions of environmental performance.
18.	How to understand and	2012	Ecological Indica	Bedrich Molda	Analysis of the different approaches and	Based on theoretical findings and	From the study of this research paper it has

	measure environmental sustainability: Indicators and targets		tors,Elsvier	n, Svatava Janouskova, Tomas Hak	types of indicators developed which are used for the assessment of environmental sustainability is done. One important aspect here is setting targets and then "measuring" the distance to a target to get the appropriate information on the current state or trend.	some successful examples from real policy making, sustainability indicators should be linked to some reference values and targets. Environmental sustainability, unlike the economic or social spheres, seems to be open for developing and using targets that are firmly rooted in the biophysical properties of the system.	been observed that for generations, the world seemed so large as to be inexhaustible, but between our population growth and the scale with which science and technology have multiplied our impacts, planetary limits or boundaries suddenly seem very near or have already been overstepped.
19.	A Study of Financial Performance: A Comparative analysis of SBI and ICICI bank.	2012	International Journal of Marketing, Financial Services & Manageme	Anurag B. Singh and Priyanka Tandon	Data: Secondary Data Sample: Covers 5 year period 2007-08 to 2011-12 Test: Ratio analysis, mean and Compound growth rate applied	ICICI has suffered with funds or avoid providing advances through 2007-08 to 2009-10 while SBI Advances were continuously increased.	The study is based on the secondary data and the limitation of using secondary data may affect the results.

			nt Research				
20.	Is the tail wagging the dog?An empirical analysis of corporate carbon footprints and financial performance.	2011	Scholarship Ucla institute of environment and sustainability.	Magali A. Delmas, Nicholas S. Nairn-Birch	For the purpose of this study novel longitudinal environmental impact data for over 1,000 US corporations from 2004 – 2008 is taken.The environmental performance data used was acquired from Trucost, an environmental data company, financial performance data is obtained from Compustat's North American database. Regression analysis is conducted.	Increasing carbon emissions positively impact financial performance when using accounting based measures (ROA) while it has a negative impact on market based measures of financial performance (Tobin's q).	It is not possible to directly infer from analysis what effect environmental regulation has on financial performance. The role of regulation in the pays-to-green debate represents an important area of future research, especially with regard to evaluating the strategic approach to climate from both a business and policy perspective.
21.	Financial performance of microfinance institutions of India	2010	Delhi Business Review	Pankaj K. Agarwal,S. K. Sinha	Out of over a hundred MFIs currently reporting to Mix Market, only five star rated MFIs has been selected. They are 22 in number.Their financial	We may conclude that most of the best performing firms are following different business models in	If the study is conducted with a broader sample the results may be different. But there is a difficulty in obtaining data. Also the data

					performance has been compared on 22 different ratios. These ratios have been chosen again from the reporting format of Mix Market.	India. This is reflected in 13 out of 22 parameters studied. However in other areas especially in risk coverage, debt equity ratio, productivity, cost per borrower, operational self sufficiency etc there exist a similarity between the firms performance	analyzed has been taken from 2008 statements Again an average of past two to three years if taken might throw more insights to the study.
22.	Environmental performance indicators: An empirical study of Canadian manufacturing firms	2008	Journal of Environmental Management	Jean Francois Henri, Marc Journeault	A random sample comprised of 1500 Canadian manufacturing organizations was formed based on the Scott's Manufacturing 2004 database. Data were collected using a survey design. Correlation analysis and ANOVA are conducted.	This study provides a better understanding of EPIs by differentiating and specifically examining two fundamental dimensions: the importance of measurement and use. Also, this study differentiates four uses of EPIs and	It has been observed that this study encompasses four organizational factors influencing the measurement and use of EPIs in manufacturing firms. Measurement of different firm characteristics could lead to other interesting results.It has

						suggests that global use and specific use of EPIs are not associated with the same firm characteristics.	been observed that the number of items used to measure the diversity of measurement of EPIs may appear small and imprecise.
23.	Does it *Really* Pay to be Green? An Empirical Study of Firm Environmental and Financial Performance	2001	Journal of Industrial Ecology	Andrew King, Michael Lenox	A sample of publicly traded U.S. manufacturing firms during the period 1987-1996 by combining the U.S. EPA's Toxic Release Inventory (TRI) with facility data from Dun & Bradstreet and corporate data from Standard & Poor's Compustat database is taken. Correlation and OLS regression analysis is conducted.	Total emission is associated with financial performance but direction of the relationship uncertain. Relative Emissions are associated with financial performance but direction of the relationship uncertain.Industry Emissions-Apparent but possibly spurious association with financial Performance but Direction of effect is uncertain.	Better results would have been obtained if other measures of environmental performance were also considered.
24.	Develop	2000	Journ	Xin	EPIs of both the	Environmental	General and

	ment of environmental performance indicators for textile process and product		al of Cleaner Production	Ren	process and product dimensions could be developed from: key process parameters that are employed by industry to indicate process efficiency and productivity; product properties related to quality and environmental impacts; emission control parameters regulated by legislation and/or end-of-pipe (EOP) treatment facilities	performance of industry should always be assessed both from process and product perspectives, especially for the consumer product manufacturing industry. There are conflicts among different kinds of environmental and/or health and safety objectives in processes, different companies, and the interests of stakeholders. Therefore, priorities must be set up at each level.	sector specific indicators aimed to evaluate the management effort in environmental improvementsh ould be developed. Social and economicaspect s also need to be identified and considered toprovide incentive for companies.

ARTICLES REVIEWED

Lindrianasari, L., Haninun, H., & Denziana, A. (2018) Environmental performance becomes important to be inspected because climate change, global warming, and environmental damage that are caused by production process lead to so many changes in manufacturing technology and hence it is essential to understand environmental careness or environmental awareness. Businesses depend on natural and human resources, thus they should take responsibilities for the consequences of their operations and also make contributions to the communities in which they operate.Hence the main objective of this paper is to obtain empirical evidence that environmental performance and environmental disclosure affect the financial performance.

Alexopoulos, I., Kounetas, K., & Tzelepis, D. (2018) There is a long standing debate regarding the link between environmental and financial performance. To date, this debate results controversial findings, triggering for further research in different industries and countries. The specific study examines the relationship between environmental and financial performance in Greekmanufacturing.

Manrique, S., & Martí-Ballester, C. (2017) The relationship between corporate environmental performance and corporate financial performance has been extensively studied in developed countries, and has received less attention in developing countries. For this reason, the main objective of this paper is to examine the effect of corporate environmental performance on corporate financial performance during a global financial crisis, depending on the economic development level of the country where a firm is located.

Mustafa, M. S., & Taqi, M. (2017)A good bank is not only the financial heart of the community but also a helping hand in every possible manner to improve the economic condition of the society. Banks are a fundamental component of the financial system and are also active players in financial markets. The essential role of a bank is to connect those who have capital, to those who seek capital. Banks have control over a large part of the supply of money in circulation. Economic development is a dynamic and continuous process which highly depends upon the extent of mobilization of resources, investment and operational efficiency of various segments i.e. trade, industrial development, and agriculture of the economy. Thus, in a modern economy like India, banks have become a part and parcel of all economic activities.

Baran, D., Pastyr, A., & Baranova, D. (2016) The success of every business enterprise is directly related to the competencies of business management. The business enterprise can, as a result, create variations of how to approach the new complex and changing situations of success in the market. Therefore managers are trying during negative times to change their management approach, to ensure long-term and stable running of the business enterprise. They are forced to continuously maintain and obtain customers and suppliers. By implementing these measures they have the opportunity to achieve a competitive advantage over other business enterprises.

Teker, S., Teker, D., & Guner, A. (2016) This empricial research article intends to analyse the financial performance of the top 20 airlines in the Word for the period of year 2011 and 2014. In order to measure the financial performance of the airlines on a uniqie base,an hormonic index is propesed by considering performance areas of profitability, operating, efficiency and liquidity. Next, each performance area is defined by using a various of performance ratios. Finally, all airlines companies examined are listed by their harmonic index scores.

Friede, G., Busch, T., & Bassen, A. (2015) The search for a relation between environmental, social, and governance (ESG) criteria and corporate financial performance (CFP) can be traced back to the beginning of the 1970s. Scholars and investors have published more than 2000 empirical studies and several review studies on this relation since then. The largest previous review study analyzes just a fraction of existing primary studies, making findings difficult to generalize. Thus, knowledge on the financial effects of ESG criteria remains fragmented. To overcome this shortcoming, this study extracts all provided primary and secondary data of previous academic review studies.

Wahba, H., & Elsayed, K.(2015) This study is aiming to provide some empirical evidence on this issue that may help in explaining divergence in prior work. The key argument in this paper is that corporate social responsibility is expected to affect financial performance positively/negatively, which in turn attracts/repels institutional investors .The possibility that firms can develop a competitive edge over rivals by investing in social responsibility has been made increasingly likely over recent years by changes in investors' behaviour and attitudes towards the society.

Nagarkar, J. J. (2015) Business cycles are not new to the Indian economy. In last ten years India witnessed two major phases of business cycle. High growth tide lifted all boats and high revenue high profits were taken for granted. The last four years have been the phase of recession. Banking industry which was growing at a high growth of +30% now is struggling to achieve 19% growth. This paper is an attempt to analyze performance of five major public, private and foreign sector banks with principle component analysis on the financial parameters. The weights are assigned on the basis of importance of the parameters on financials.

Karri, H., Meghani, K., & Mishra, B. (2015) Banks are playing crucial and significant role in the economy in capital formation due to the inherent nature, therefore banks should be given more attention than any other type of economic unit in an economy. The objective of this study is to analyze the Financial Position and Performance of the Bank of Baroda and Punjab National Bank in India based on their financial characteristics.

Kassar, T. A., & Soileau, J. S. (2014) In this paper researcher examines the performance of the same companies with solvency for predicting bankruptcy and comparison in both models. The research also demonstrates the need to include measures of both financial and non-financial performance in the evaluation as they complement each other. Without both financial and non-financial, the evaluation process is incomplete and does not provide desired results or the correct image of the process.

I., Latasri, O., Manjula, N., & Banu, A. M. (2014) Finance is regarded as the life blood of a business enterprise. In the modern oriented economy, finance is one of the basic foundations of all kinds of economics activities. Finance statements are prepared primary for decision -making .They play a dominant role in setting the frame work and managerial conclusion and can be drawn from these statements is of immense use in decision- making through analysis and interpretation of financial statements . Every business under taking needs finance for its smooth working .It has to raise funds from the cheapest and risky source to utilize this in most effective manner.

Sultan, A. S. (2014) The emergence of socially responsible investing has led to the development of a large number of methodologies for rating corporate social responsibility and to a growing body of research exploring the link between environmental and financial performance. Increased availability of information potentially generates an abundance of riches upon which to base investment decisions, but it also raises issues of commensurability, information overload, and confusion. Using a unique data set combining environmental ratings from three leading purveyors, this study has identified the principal components of corporate environmental performance. This study find the two distinct factors—the environmental processes and practices implemented by firms, and the environmental outcomes they generate—explain 80% of the variance of the data.

Alfonso, O., & Villegas, J. B. (2014) Financial Analysis is the process of assessing the financial position of a company by analyzing its stability, viability and profitability. One of the primary objectives of financial analysis is to recognize changes in financial trends, to help measure the progress made by an enterprise and identify a relationship to draw a logical conclusion on the performance of the company. Another major aspect of a financial analysis is comparing the performance of the company with its competitors.

Islam, M. A. (2014) Research in this field may yield new ideas and theories about the existing theoretical framework on capital structure, stakeholder management and risk management. A case-study is analyzed in this paper: the financial performance of the first metro line in Seville (Spain). In spite of previous cost overruns in the construction stage, the present operation stage is considered successful from the point of view of social and financial profitability, whereby the risks have been theoretically transferred to stakeholders, as defined by Value for Money considerations.

Geetha, T., & Ramasamy, S. (2014) Financial analysis is structural and logical way to present overall financial performance of a financial institution. It's also help to evaluate and decision making for business operation. In financial analysis process ratio analysis is the most dominant and logical structure to help business related stakeholder. Under the financial ratio analysis process there are few categories to identical area of financial institution. So business stakeholders try to concentrate to get overall business overview from profitability, liquidity, assets management and solvency ratio analysis.

Nairn-Birch, N., & Etzion, D. (2013) The production of cement in India has increased at a compound annual growth rate (CAGR) of 9.7 percent to reach 272 million tons (MT) n the period 2006-2013.It is expected to touch 407 MT by 2020In this research the author make use of cement industry in India to find out the overall financial performance efficiency.

Moldan, B., & Hak, T. (2012) The concept of sustainable development from 1980 to the present has evolved into definitions of the three pillars of sustainability (social, economic and environmental). The recent economic and financial crisis has helped to newly define economic sustainability. It has brought into focus the economic pillar and cast a question mark over the sustainability of development based on economic progress. This means fully addressing the economic issues on their own merits with no apparent connection to the environmental aspects. Environmental sustainability is correctly defined by focusing on its biogeophysical aspects. This means maintaining or improving the integrity of the Earth's life supporting systems. The concept of sustainable development and its three pillars has evolved from a rather vague and mostly qualitative notion to more precise specifications defined many times over in quantitative terms. Hence the need for a wide array of indicators is very clear.

Tandon, P., & Singh, A. (2012) Banking Sector plays an important role in economic development of a country. The banking system of India is featured by a large network of bank branches, serving many kinds of financial services of the people. The State Bank of India, popularly known as SBI is one of the leading bank of public sector in India. SBI has 14 Local Head Offices and 57 Zonal Offices located at important cities throughout the country. ICICI Bank is second largest and leading bank of private sector in India. The Bank has 2,533 branches and 6,800 ATMs in India. The purpose of the study is to examine the financial performance of SBI and ICICI Bank, public sector and private sector respectively.

Nairn-Birch, N. S., & Delmas, M. A. (2011) There is a long-standing debate in the business strategy literature over whether or not firms profit from improving their environmental performance. However, the existing literature has focused mostly on regulated emissions data and few studies have included climate change in this debate or taken a life cycle analysis approach to defining environmental performance. Hence the main objective of this paper is to investigates the impact of greenhouse gas emissions (GHG) on corporate financial performance, and develops complementary hypotheses based on accounting and market based corporate performance measures to represent a short term and long-term perspective on financial performance.

Agarwal, P. K., & Sinha, S.K. (2010) The Task Force on Supportive Policy and Regulatory Framework for Microfinance constituted by NABARD defined microfinance as the provision of thrift, saving, credit and financial services and products of very small amount to the poor in rural, semi-urban and urban areas for enabling them to raise their income levels and improve their standard of living (Sen, 2008.The present study is an attempt to analyze the financial performance of various microfinance institutions operating in India. MFIs must be able to sustain themselves financially in order to continue pursuing their lofty objectives, through good financial performance.

Henri, J. F., & Journeault, M. (2008) The aim of this exploratory study is to examine the importance of measurement and the use of environmental performance indicators (EPIs) within manufacturing firms in Canada. EPIs represent numerical measures providing key information related to environmental issues.Hence the main objectives are to determine (i)To what extent are firm characteristics associated with the importance of measurement of various categories of EPIs? (ii) To what extent are firm characteristics associated with global and specific uses of EPIs?

King, A., & Lenox, M. (2001) Previous empirical work suggests that profitable firms tend to have high environmental performance, but questions persist about the nature of the relationship. Does stronger environmental performance really lead to better financial performance or is the observed relationship the outcome of some other underlying firm attribute? Does it pay to have clean running facilities or to have facilities in relatively clean industries?These are some of the important issues which are discussed in this paper.

Ren, X. (2000) The increasing demand for environmental performance evaluation of industry requires development of sector-specific environmental performance indicators (EPIs). For the consumer product manufacturing industry, in this case the textile industry, the need to evaluate environmental performance both from process and product life cycle perspectives leads to development of EPIs of process and product dimensions. Such types of EPIs have been developed, with best achievable values being identified, by this study for cotton woven products and wet processing. An in-depth discussion has been presented concerning problems in developing and applying EPIs.

RESEARCH GAP

Despite the several studies in environmental performance and financial performance, it is evident from the above-reviewed literature that there are a number of limitations which calls for further investigation and research.

- It has been observed that extant literature has focused on answering the question "does it pay to be green" and yielded contradictory results with some reasons identified as the difference in geographical locations, methodology, sample size, control variables, time variables among others.
- Some researchers found a positive relationship while others found a negative link.Some studies, on the other hand,could not establish a conclusive relationship between them.
- Hence it has been observed that there is a discord in the reality about the relationship between the environmental performance and the financial performance of the firms.
- It has also been observed that most of these studies have been conducted in developed countries and a few studies have been conducted in developing countries like India.

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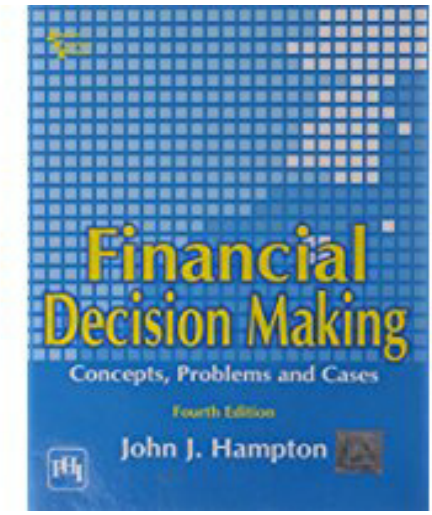
Book Review 1

Hampton, J. J. (2014). Financial Decision Making: Concepts, Problems, & Cases. Reston.



Financial Decision Making continues its step-by-step approach to the principles of finance. Still, the changes over the past 15 years have been significant indeed. The fourth edition of Financial Decision Making takes care to balance concepts and applications. Before covering the techniques of financial analysis, it develops the logic and reasoning process. The electronic spreadsheet, with all its math capabilities is used where appropriate. Despite its substantial reworking, Financial Decision Making continues its stress on the analytical aspects of managing business. Many individuals have contributed comments and observations on previous editions.

The author of this book is John J. Hampton. JJ Hampton was born and raised in Stephenville and Erath County to Johnny Wayne and Barbara Hampton. She graduated from Stephenville High School and was an honours graduate from Tarleton State University. She enjoys family time, her real estate profession, and equestrian sports.

Striving for excellence in every aspect of her life, JJ is an accomplished Realtor® with expertise in the sale of all types of properties in Erath and surrounding counties. She is customer-driven, and her competitive nature benefits her clients by pushing her to achieve the desired results as well as providing exceptional service. She has no “down time” in her world, so her clients have a 24-hour a day professional who is hard at work to service their needs. In this book a step-by-step practical approach to the process of evaluating financial positions and making decisions based on effective problem-solving methodologies is provided.

The challenges of managing and financing large organisations are greater than ever. By reading this book we can discover ideas and techniques to assist in solving problems and making decisions.

Part I – THE FOUNDATION

Chapter 1: Overview of Financial Management –This part involves detail regarding financial management. In the beginning environment of the firm is described and the important functions that financial manager do. Discusses various areas of finance, these are – Public finance, security and investment analysis, international finance, institutional finance and financial management. Author explains about two main objectives of the firm, first is maximization of profit and second is maximization of wealth. In this part author also discloses about goals of finance management, primary goal is Profit-risk approach to financial goals, secondary one is liquidity profitability approach. Various functions of financial management are also discussed in this chapter, like functions leading to liquidity, profitability and management functions.

Chapter 2: Financial Securities and Markets – This part explains about the various main forms of business organisations, these are – Sole proprietorship, partnership and corporation. Proper description about preferred stock and common stock is provided along with examples. Author explains about the capital structure which is composition of debt and equity securities that comprises a firm financing if its assets. Internal and External factors that affect capital structure are also discussed in that part. Various markets for corporate securities are also explained, these are Primary markets, Secondary markets, over-the counter market, New York stock exchange, America stock exchange and other stock exchanges.

Chapter 3: Review of Financial Accounting - In this chapter researcher reviewed the basic principles and structure of financial accounting. The rules of and different categories of accounting are covered first. Then the basic technique of double entry accounting is examined along with examples of debit and credit transactions. Author explains about the fundamentals of financial accounting as a first step towards managerial accounting. The techniques of recording transactions correctly must be understood before an analyst can use accounting data to develop budgets and financial plans. Similarly, an ability to firm's liquidity and profitability position requires a basic knowledge of the assumptions and methodology of financial accounting.

Part II – THE FIRM AND ITS OPERATIONS

Chapter 4: Financial Statements –In this chapter researcher examined the major characteristics of the firm's financial statements. Different statements are prepared with different purposes in mind, even the same statement varies when prepared by two different managers or firms. Knowing the purposes and characteristics of each kind of statement, the analyst can use the statements to gain a great deal of information concerning the status of a company. To avoid misunderstanding author defines important terms of financial statements in this part. These terms include funds and working capital, balance sheet, assets, liabilities, equity, etc. Then uses and

limitations of Balance Sheet are discussed. In another part of chapter details about income statement is provided. Then about two formats of Income statement are provided, these are Management format and Marginal Analysis format.

Chapter 5: Financial Analysis –Financial Analysis is the process of determining the significant operating and financial characteristics of a firm from accounting data and financial statements. In the chapter, ratio analysis as the primary tool for examining the firm's financial position and performance is discussed. Researcher reviewed two viewpoints in receiving and evaluating financial data, these are external analysis and internal analysis. It also discloses that financial analysis is used primarily to gain insights into operating and financial problems confronting the firm. Author explained that we must be careful to distinguish between the cause of the problem and the symptom of it. As we can see in this chapter, financial ratios are used to locate symptoms of problems. Once the symptoms have been located, the financial analyst must determine the cause of any problem. Then he must find a solution for it.

Chapter 6: Profit Planning – In this chapter, researcher examined the basic principles of profit planning. Planning is the specific process of setting goals and developing ways to reach them. This involves the management of resources and decision making both in the near and long term. Break even analysis and profit volume analysis, two tools for managing assets in the near term are explained. Author also covered marginal analysis as a technique for forecasting operating results with the aid of the income statement. Methods for estimating the value of the firm's common stock, using the technique of future earnings per share is explained. All of these techniques are designed to assist the firm in managing its assets over the next accounting period, normally a single year.

Chapter 7: Leverage –In this Chapter author bring together the different concepts of leverage in the planning process of the firm. Each concept will link a measure of profit, such as return on investment or earnings before taxes, with another area of the firms operating or financial firms operating or financial situation. In the area of profit planning, the firm seeks ways to conduct its operations to increase the amount of profit that reaches the bottom line, on the line showing net income after taxes. Each type of leverages will be analysed to determine what it measures and what it shows with respect to the firm's operations or financing. As researcher reviewed each type of leverage used as a tool of financial planning to provide the insights into specific areas of the firms anticipated profits. This concept is valid in running a company. The financial manager can identify many different types of leverage. In most cases the effects are reversible, so that the leverage may be favourable or unfavourable.

Part III – WORKING CAPITAL MANAGEMENT

Chapter 8: Working Capital and Cash Management – In this chapter, researcher examined policies for the management of a firm short-term assets and liabilities. One of the most important area in the day to day management of the firm deals with the management of working capital,

which is defined as all the short-term assets used in daily operations. This consists primarily of cash, marketable securities, accounts receivables and inventory. Author describes its nature of working capital and issues affecting it. Discussion on policies for managing cash and assets that have the characteristics of cash is there. The balancing in these accounts can be highly volatile so they respond quickly to the changes in the firms operating environment.

Chapter 9: Management of Receivables and Inventory – In this chapter, researcher examine the major principles of receivables and inventory management. Receivables are assets accounts representing amounts owed to the firm as a result of the sale of goods or services in the ordinary cause of business. It begins with the policies and techniques for managing receivables. Author explained about management of cash and marketable securities, in addition to it, the financial manager must be concerned with two other important areas of working capital.

Chapter 10: Economics of Working Capital – In this chapter author develops techniques to measure the cost of financing receivables and inventory. As author examined in the previous chapter, that it cost money when the firm ties up its resources in working capital. Usually the firm pays for raw material, labour and overhead items before the goods are sold. Similarly, funds tied up in receivables are not available for investment. The cost of financing working capital can be a significant financial exposure of a business.

Chapter 11: Investing Excess Cash – In this chapter researcher examined the major marketable securities available to the firm and will develop techniques for calculating the rates of return on each. An important aspect of working capital management involves investing excess cash. Basically, this is a task of balancing liquidity and profitability needs. The firm purchases marketable securities that can easily be converted to cash with a minimum of difficulty or transactions cost.

Part IV – INVESTMENT POLICY

Chapter 12: Capital Budgeting – In this chapter author begins completely new emphasis. For the remainder of the book author deals with the investment and financing decisions that must be made before the firm can successfully conduct operations. He develops techniques for forecasting the return from proposals and determining the required level of return before an investment is acceptable. Some of the decision making techniques for analyzing firm's liquidity and profitability; managing its cash, receivables and inventory; and forecasting results when we consider factors such as firms breakeven point, the degree of leverage in its operations and financing, and the impact of inflation. Finally he covers the management of funds by examining the differing sources of financing and how the firm's policies on dividends and leasing can affect these sources.

Chapter 13: Risk and Required Return – This chapter is based on capital asset approach to the required return. Author tied the model in to the traditional cost of capital theory. The conceptual basis for examining the relationship between risk and return is developed in a framework called

the capital asset pricing model. He offers a theory and methodology for evaluating any investment decision where capital is committed for the purpose of earning future profits. The model was first proposed and developed by Sharpe, Lintner, Miller and Modigliani and others in the 1960s and is fully developed today. It has modified cost of capital analysis and the approach to capital budgeting in the firm

Chapter 14: Valuation of the Firm – Throughout the study of finance, we have emphasized the goal of maximization of wealth, the maximization of the present value of firms common stock. The firm's earnings, dividends, growth rate, and psychological factors contribute to the value of its stock in the marketplace. In this chapter author broaden his analysis. He began with the valuation of the of the firm's fixed return securities. Then he covers common stock value in perfect and imperfect markets. Finally researcher examined the issues related to the valuation of the firm in light of the capital asset theory.

Chapter 15: Mergers and Acquisition – In this chapter author explains about various measures corporate growth. Financial manager uses the term growth mean increases in the size and activities of a firm over the long run. Three measures of corporate growth are, increase in sales, increase in profits and increase in assets. Then the chapter explained about the forms of business combinations like mergers, consolidations, holding companies, non-tenable reorganisation etc. As firms seek the advantages found in external growth situation, they must deal with and analyse a variety of environmental factor, including antitrust considerations, availability of financing, taxation and money market factors.

Part V – FINANCING DECISIONS

Chapter 16: Sources of Short and Intermediate-Term Financing – In this chapter, researcher examined the sources of short and intermediate term funds supplied by creditors. In the conduct of business, a firm obtains its funds from a variety of sources. Some capital is provided by supplies, creditors and owners, while other funds arise from earnings retailed in the business. Detailed study is done about short term financing, which includes it characteristics, goals etc. In another part, chapter has described the primary forms of secured and unsecured short and intermediate term financing available to the firm.

Chapter 17: Long-Term Financing Decisions – This chapter begins with an introduction to speciality securities, convertible bonds and warrants. Then researcher examine the characteristics of long term project financing, the firm has a choice between debt and equality sources. The general characteristics of these sources were discussed before, based upon these characteristics, the financial manager weigh a number of factors when choosing the mix of long term debt, preferred stock and common stock to finance the firm's assets

Chapter 18: Lease-Buy Decisions – In this chapter, author covers about the basic characteristics of different kinds of leases. Leasing is an arrangement that provides the firm with the use and control over assets without receiving title to them. A lease is the written arrangement allowing

the use of the assets for specified period of time. The lease is signed by the owner of the assets called as lessor and the user called as lessee. Leasing has become an increasingly important source of long term funds for large and small companies. Then he discloses some conceptual issues involved with leasing as a source of funds which includes the concepts of instalment financing and its characteristics, factors used in lease buy decisions.

Chapter 19: Dividend Policies and Decisions – In this chapter author explained about the dividend policies and the nature of the dividend decisions in the introduction part. A firm's dividend policies have the effect of dividing the firm's after-tax profit into two categories which are funds to finance long term growth and funds to be distributed to shareholders. Chapter also discloses about two possible approaches to dividend decisions, which includes long term financing decision and maximum of wealth decision.

BOOK REVIEW 2

Walliman, N. (2011) RESEARCH METHODS THE BASICS

Research Methods: The Basics is an accessible, user-friendly introduction to the different aspects of research theory, methods and practice. Structured in two parts, the first covering the nature of knowledge and the reasons for research, and the second the specific methods used to carry out effective research.The author of this book is Nicholas Walliman.This book covers:

- Structuring and planning a research project.
- The ethical issues involved in research.
- Different types of data and how they are measured.
- Collecting and analysing data in order to draw sound conclusions.
- Devising a research proposal and writing up the research.

PART I- RESEARCH THEORY AND PRACTICE

Chapter 1: Research basics-In this chapter basic concepts of research and research methods are discussed. Research methods are the techniques we use to do research.Research can be used for various purposes such as categorising,describing,explaining,evaluating,comparing and correlating. There are numerous types of research design that are appropriate for the different types of research projects.There are different types of research design such as historical, descriptive, correlation,comparative,experimental,simulation,evaluation,action,ethnological.It is very essential to select an appropriate research design.

Chapter 2: Research Theory-In this chapter some of the important concepts are discussed such as Inductive reasoning ,deductive reasoning,hypothetico-deductive method. Inductive reasoning starts from specific observations or sensory experiences and then develops a general conclusion from them. Deductive reasoning begins with general statements (premises) and, through logical argument, comes to a specific conclusion. The hypothetico-deductive method combines inductive and deductive reasoning. Some important issues that confronts the study of the social sciences that are not so pertinent in the natural sciences such as positivism, relativism, postmodernism, critical realism are also discussed.

Chapter 3:Structuring the research project- In this chapter structure of research project is discussed. Research projects are set up in order to explain a phenomenon or to test a theory. The answers to four important questions underpin the framework of any research project:

- What are we going to do? The subject of our research.
- Why are we going to do it? The reason for this research being necessary or interesting.
- How are we going to do it? The research methods that we will use to carry out the project.
- When are we going to do it? The programme of the work.

Chapter 4:Research Ethics-In this chapter research ethics are discussed. We cannot trust the results of a research project if we suspect that integrity has not been maintained. There are two aspects of ethical issues in research: The individual values of the researcher relating to honesty and frankness and personal integrity. The researcher's treatment of other people involved in the research, relating to informed consent, confidentiality, anonymity and courtesy. Although honesty must be maintained in all aspects of the research work, it is worth focusing here on several of the most important issues such as intellectual ownership and plagiarism, acknowledgement and citation.Some of the important aspects that need to considered while doing research are potential harm and gain,recording data,participant involvement sensitive material,honesty,deception and covert methods,storing and transmitting data,chacking data and drafts etc.

Chapter 5:Finding and Reviewing the Literature-In this chapter various aspects of literature review are considered.The most important reason for doing research is to produce new knowledge and understanding, and to disseminate it to make it available to everyone. When planning a research project, it is essential to know what the current state of knowledge is inour chosen subject as it is obviously a waste of time to spend months producing knowledge that is already freely available. Some of the various sources for conducting literature review are libraries, newspapers and journals, electronic database etc. Government departments such as Standards Institutes, Records Offices, Statistical Offices provide information for the public. Pressure groups and voluntary organizations often produce publications about their work. Research establishments, professional and trade organizations also release details about latest research. Check list for conducting literature review are to compile an overview of the literature

to illustrate the interplay of ideas and major steps in the development of your subject to introduce the important issues of our research problem through the analysis of the literature,to explain the general theoretical background to help the reader understand the attitudes behind the reviewed literature and oour own philosophical stance.

PART II- THE MAIN RESEARCH METHODS

Chapter 6:The Nature of Data- In this chapter the researcher look at the raw material of research – data. In order to collect and analyse them, it is important to understand what they are and what their characteristics are and how they can be measured.Researcher also consider how statements about data can be expressed at different levels of abstraction, from the up-in-the-sky theoretical to the down-to-earth practical. In this chapter hierarchy of information is explained. It comprises of-Theory ,Concepts , Indicators , Values .Data is broadly classified into two different types primary and secondary data. Data that has been observed, experienced or recorded close to the event are the nearest one can get to the truth, and are called primary data. Written sources that interpret or record primary data are called secondary sources, which tend to be less reliable.There are four basic types of primary data measurement,observation,interrogation and participation. Data are also divided into two other categories, referring not to their source but to their characteristics; basically whether they can be reduced to numbers or presented only in words. This affects the way that they are collected, recorded and analysed.These are quantitative and qualitative data. Data can be measured in different ways depending on their nature. These are commonly referred to as levels of measurement – nominal, ordinal, interval and ratio.

Chapter 7:Collecting and Analysing Secondary data-In this chapter research examined that we do not always need to do the data collection ourselves but can rely on that collected by others. Where to find it and how to analyse it is explored, and also how to test it for reliability. There are numerous types of secondary data, the main being documentary sources in the form of written and non-written materials, and survey data in the form of statistical information.Written materials comprise of organizational records such as internal reports, annual reports, production records, personnel data, committee reports and minutes of meeting communications such as emails, publications, such as books, journals, newspapers, advertising copy, government publications of all kinds etc. s Non-written materials comprise of television programmes, radio programmes, tape recordings, video tapes, films of all types, including documentary, live reporting, interviews, etc. works of art, historical artefacts etc. s Survey data comprise of government census of population, employment, household surveys, economic data, organizational surveys of markets, sales, economic forecasts, employee attitudes. These may be carried out on a periodic basis, with frequent regularity or continuously, or ad hoc or one-off occasions. They may also be limited to sector, time, area. There are several online sites that provide access to data sets from a variety of sources, such as The Data Archive (www.data-archive. ac.uk) that supplies over 4,000 data sets from sources worldwide, such as government, opinion poll organizations, academic researchers etc.It is essential to analyse the credibility of

data obtained.Various other concepts are discussed such as content analysis,meta analysis,data mining etc.

Chapter 8: Collecting Primary Data- In this chapter a number of methods for collecting primary data ranging from asking questions, making observations, to generating our own data through experiments and simulations are dicussed. Before we explore the different methods of data collection, we need to consider the issue of selecting who to question or what to examine when faced with a large number of cases.It is essential to understand the concept of sampling. There are basically two types of sampling procedure: 1. Probability sampling 2 .Non-probability sampling. There are several basic methods used to collect primary data; here are the main ones: asking questions, conducting interviews , observing without getting involved , immersing oneself in a situation , doing experiments , manipulating models.

Chapter 9:Quantitative Data Analysis-Quantitative analysis deals with data in the form of numbers and uses mathematical operations to investigate their properties. The levels of measurement used in the collection of the data i.e. nominal, ordinal, interval and ratio, are an important factor in choosing the type of analysis that is applicable, as is the numbers of cases involved. Some of the primary purposes of quantitative analysis are to measure ,to make comparisons ,to examine relationships ,to make forecasts,to test hypotheses ,to construct concepts and theories ,to explore ,to control ,to explain. The two major classes of statistics are parametric and non-parametric statistics. A parameter of a population (i.e. the things or people you are surveying) is a constant feature that it shares with other populations. The most common one is the 'bell' or 'Gaussian' curve of normal frequency distribution. There are two classes of parametric statistical tests: descriptive and inferential. Distinction is also made between the number of variables considered in relation to each other:Univariate,Bivariate and Mutivariate analysis. Multivariate analysis include elaborate analysis,multiple regression,logistic regression.

Chapter 10:Qualitative data Analysis-In this chapter various aspects of qualitative data analysis are considered. There are various steps involved in qualitative data analysis such as-Clearly state the research issues or questions,collect background information to help understand the relevant context, concepts and theories suggest several interpretations or answers to the research problems or questions based on this information, use these to direct your search for evidence that might support or contradict these. Change the interpretations or answers if necessary, continue looking for relevant evidence. Eliminate interpretations or answers that are contradicted, leaving, hopefully, one or more that are supported by the evidence, 'Cross examine' the quality and sources of the evidence to ensure accuracy and consistency,carefully check the logic and validity of the arguments leading to your conclusions and select the strongest case in the event of more than one possible conclusion,if appropriate, suggest a plan of action in the light of this and prepare our report as an account of your research.In this chapter typologies and taxonomies are explained,pattern coding is also explained.There are different types of displays-Time ordered displays,role ordered displays,partially ordered displays,meta displays,case ordered displayed.

Chapter 11:Writing the Proposal and writing up Research- In this chapter some of the important points that need to be considered while writing research report are considered.One of the skills essential to successful research is that of writing. Good communication is required at every stage of the project, but the main writing tasks are located at the beginning and end of the research project – at the beginning to explain what you will do in the research, and at the end, to explain what we have done and what we have found out.It is essential to formulate appropriate research proposals. Academic research proposals are usually composed of the following elements: the title; aims of the research; the background to the research – context and previous research; a definition of the research problem; outline of methods of data collection and analysis; possible outcomes; timetable of the project and description of any resources required; list of references.

BOOK REVIEW 3

Sustainability,Environmental Performance and Disclosures

Martin Freedman and Bikki Jaggi

The first chapter in this book is devoted to developing theories for social accounting. In the firstsection of their treatise, the authors provide an excellent description for developing theories in any social science, and i find it to be a great pedagogical tool for a research methodology course in accounting. By describing and categorizing the theories for social accounting research andliterature (in a sense mapping the research), the authors provide a framework to better understand the literature and to propel its progress. They provide a great starting point for those thinking about entering the field. There is also a sense of hope that social accounting can lead to policies that will sustain the planet in the future.

In the second chapter, author has examined the market reaction to environmental disclosures made by the Canadian mining industry following an environmental disaster at a mine owned by a Canadian company. Prior studies had indicated that environmental disclosures mitigate the market impact for the firm of negative environmental events, but the author has attributed this to signaling. However, Professor Magness considers different elements of the environmental disclosures in her analysis and obtains conflicting results. She concludes that there is miscommunication between management's signal and investors' interpretation of environmental information.

In the third chapter of this book authors have explored the relationship between corporate reputation and sustainability reports. Using Fortune magazine's annual survey of America's most admiredcompanies as their source for reputation, they conclude that reputations do not improve for first time issuers of standalone sustainability reports. Thus, it appears that just issuing a report does not increase a firm's reputation. However, there is a strong correlation between the highest (lowest) quality reports and reputation. This seems to imply that managing one's reputation requires some real effort.

In the fourth chapter authors have examined companies that have proactive environmental management strategies. For these companies, environmental commitment is a top priority for all levels of management. Using seven measures of management control actions that manifest environmental proactivity, the authors find strong evidence showing that five of seven measures made a difference in performance. Furthermore, they find that firms that are considered to have the best environmental performance are those that are best in proactively integrating the environmental management decisions into their processes.

In the fifth chapter authors have compared the GHG disclosures and performance that were made by companies from the EU and two other countries that ratified the protocol, that is, Japan and Canada. They find that despite their initial start, the EU companies overall disclose less than either Japanese or Canadian companies about GHG and the protocol. Furthermore, they find that within the EU countries there is differential GHG disclosure. In terms of the relationship between GHG performance and disclosure, they detect no significant association.

The book concludes with a research note from Charles H. Cho and Dennis M. Patten. In this note, the authors lament that few US accounting professors classify themselves as social and that there are very few social accounting articles (using the broadest definition) that have been published in four of the top journals in accounting. They believe that there are many more US academics that fall inthe social accounting camp based on their publications and that there are numerous high-quality outlets from social accounting research. Nevertheless, they emphasize that there is a need for expanding and nurturing this area of accounting.

PLAN OF WORK AND METHODOLOGY

Statement of problem

The present study would be aiming to understand the relationship between environmental performance and financial performance of selected Indian Companies.

Scope of the Study

Due to the increased public concern both in India and in the rest of the world, environmental issues are very important in attaining firm reputation. However, it has been observed that there is a discord about the relationship between the environmental performance and the financial performance of the firms. For this reason, in this study it is aimed to analyze the relationship of financial performance and environmental performance of the selected Cement companies operating in India.The companies included in the study are UltraTech Cement,Shree CementAmbuja Cement,ACC.

Relevance of the Study

The undertaken research will be helpful for-

- **Policy Makers-**This study will educate the policy makers on ways in which the environmental performance of companies can be measured and analysed using ISO requirement.
- **Management and Stakeholders-**This research may prove useful to management of the companies and other stakeholders and Investors in different ways for their decision making.
- **Researchers, Academicians and students-**For all those students, academicians and researchers who want to learn about these concepts or want to do research on these concepts this study would be very helpful.

Research questions

1. Whether there is a relationship between environmental performance and financial performance?
2. Whether there is an impact of financial performance on environmental performance?
3. Whether there is an impact of environmental performance on financial performance?

Objectives of the study

1. To find out the relationship between environmental performance and financial performance of selected Cement companies in India.
2. To examine the impact of Financial performance on Environmental performance of selected Cement companies in India.
3. To examine the impact of Environmental performance on financial performance of selected Cement companies in India.
4. To explore the various environmental performance indicators which are effecting financial performance of selected Cement companies in India.
5. To examine the various financial performance indicators of selected Cement companies in India.
6. To analyse the trend of financial performance and environmental performance of selected Cement companies in India over the period of the study.

Hypothesis of the study

Hypothesis is the statement which is yet to be proven. It is used in almost all the research as it validates the assumption of the researcher. Following hypotheses are framed based on the objectives of the study.

Hypothesis 1:

H_{01}: There is no significant relationship between environmental performance and financial performance.

H_{a1}: There is a significant relationship between environmental performance and financial performance.

Hypothesis 2:

H_{02}: There is no significant impact of Financial performance on Environmental performance.

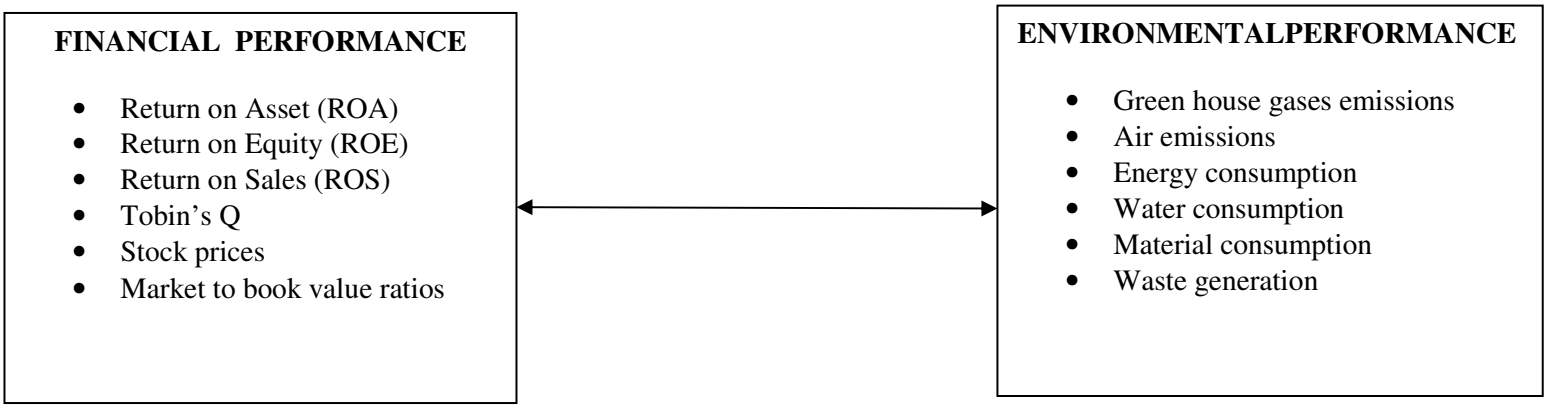
H_{a2}: There is a significant impact of Financial performance on Environmental performance.

Hypothesis 3:

H_{03}: There is no significant impact of environmental performance on Financial performance.

H_{a3}: There is a significant impact of environmental performance on financial performance.

PARAMETERS AND VARIABLES



Research Methodology

Research Design:

The proposed study will be based on the following Research Design:

Exploratory	Descriptive	Empirical
• Review of Literature has been undertaken and will also be referred to in future. • Various variables to be used in study have been explored.	Representation of data as it is collected.	Testing the Hypothesis.

Universe of the study

For the purpose of the study, universe of the study comprises all the listed cement companies in India.

Sample Details

Sample selection has been done by using following methodology:

Top 4 cement Companies has been selected out of all the listed cement companies on the basis of market capitalization as on 31 March 2019.

Sampling Process Undertaken

1. Identifying the Target - All listed cement companies.

2. Determination of the sample Size -4 listed cement companies on the basis of market capitalization as on 31 March 2019.

Hence four cement companies are included in this study-

1.UltraTech Cement

2.Shree Cement

3.Ambuja Cement

4.ACC.

Period of Study:

The time frame for the purpose of research covers the study period of **7 years starting from 1 April 2014 to 31 March 2019.** Basis for selection of this period are as follows:

In 2012 SEBI mandated inclusion of Business Responsibility Report (BRR) as a part of the Annual Report for top 100 listed entities based on market capitalization at BSE and NSE. Business Responsibility Report is a disclosure regarding adoption of responsible business practices by a listed company to all its stakeholders. Ministry of Corporate Affairs, Government of India came out with National Voluntary Guidelines on Social, Environmental and Economic Responsibilities of Business. These guidelines contain comprehensive principles to be adopted by companies as part of their business practices and a structured business responsibility reporting format requiring certain specified disclosures, demonstrating the steps taken by companies to implement the said principles.

The Ministry of Corporate Affairs has notified Section 135 and Schedule VII of the Companies Act 2013 as well as the provisions of the Companies (Corporate Social Responsibility Policy) Rules, 2014 to come into effect from April 1, 2014. With effect from April 1, 2014, every

company, private limited or public limited, which either has a net worth of Rs 500 crore or a turnover of Rs 1,000 crore or net profit of Rs 5 crore, needs to spend at least 2% of its average net profit for the immediately preceding three financial years on corporate social responsibility activities. The CSR activities should not be undertaken in the normal course of business and must be with respect to any of the activities mentioned in Schedule VII of the 2013 Act. Contribution to any political party is not considered to be a CSR activity and only activities in India would be considered for computing CSR expenditure.

The activities that can be undertaken by a company to fulfil its CSR obligations include eradicating hunger, poverty and malnutrition, promoting preventive healthcare, promoting education and promoting gender equality, setting up homes for women, orphans and the senior citizens, measures for reducing inequalities faced by socially and economically backward groups, ensuring **environmental sustainability and ecological balance**, animal welfare, protection of national heritage and art and culture, measures for the benefit of armed forces veterans, war widows and their dependents, training to promote rural, nationally recognized, Paralympic or Olympic sports, contribution to the prime minister's national relief fund or any other fund set up by the Central Government for socio economic development and relief and welfare of SC, ST, OBCs, minorities and women, contributions or funds provided to technology incubators located within academic institutions approved by the Central Government and rural development projects.

Sources of Data Collection:

This study is primarily based on secondary data and it will be collected through published annual reports of the selected companies,business responsibility reports,research papers, publications, journals and web.

Tools & Techniques for data analysis:

The various techniques and tools that will be used in order to derive the results of the proposed study are correlation,regression,descriptive analysis,factor analysis,Trend analysis,rank analysis.

Objectives	Hypothesis	Techniques and tests
• To find out the relationship between environmental performance and financial performance of selected Cement companies in India.	There is no significant relationship between environmental performance and financial performance.	Co-relation

• To examine the impact of Financial performance on Environmental performance of selected Cement companies in India.	There is no significant impact of Financial performance on Environmental Performance.	Regression analysis
• To examine the impact of Environmental performance on financial performance of selected Cement companies in India.	There is no significant impact of environmental performance on Financial Performance.	Regression analysis
• To explore the various environmental performance indicators effecting financial performance of selected Cement companies in India.	-	Rank analysis,Factor analysis
• To examine the various financial performance indicators of selected Cement companies in India.	-	Rank analysis,Factor analysis
• To analyse the trend of financial performance and environmental performance of selected Cement companies in India over the period of the study.	-	Descriptive statistics-Table, graph, Mean, Median ,Standard deviation,Trend analysis,testing of significance of mean-t test,ANOVA.

Limitations of the study

- The study's primary limitation lies in the sample size used due to the lack of access to sufficient environmental performance data.
- Another pertinent drawback is that the present study is limited to only five year time period (2014-15 – 2018-19).

Scheme of chapterization

Title	
List of Abbreviations	
List of Tables	
List of Figures	
CHAPTER 1	**INTRODUCTION**
1.1	Concept and need of environmental performance
1.2	Concept of financial performance
1.3	Parameters related to financial performance
1.4	Relationship of environmental performance and financial performance
1.5	Limitations of environmental performance and financial performance
CHAPTER 2	**CEMENT INDUSTRY IN INDIA**
2.1	Overview of cement
2.2	Importance and uses of cement
2.3	Growth and development of cement industry in India
2.4	Cement companies under study
2.5	Conceptual framework of the study
2.6	Various aspects of the study

CHAPTER 3	**RESEARCH METHODOLOGY**
3.1	Review of Literature
3.2	Research Gap
3.3	Statement of Problem
3.4	Scope of the study
3.5	Relevance of the study
3.6	Objectives of the study
3.7	Hypothesis of the study
3.8	Research Methodology
3.9	Data Collection
3.10	Statistical tools for Hypothesis Testing
CHAPTER 4	**DATA ANALYSIS AND INTERPRETATION**
CHAPTER 5	**FINDINGS, CONCLUSION AND SUGGESTIONS**
5.1	Findings of the Study
5.2	Conclusion
5.3	Suggestions
5.4	Limitations of the Study
5.5	Scope for further Research
Bibliography and Webliography (Websites)	
References	
Appendices	

REFERENCES

- Lindrianasari, L., Haninun, H., & Denziana, A. (2018). The effect of environmental performance and disclosure on financial performance. *International Journal of Economics, Business and Entrepreneurship,11*, 138-148.

- Alexopoulos, I., Kounetas, K., & Tzelepis, D. (2018). Environmental and Financial Performance. Is there a win-win or a win-loss situation? Evidence from the Greek manufacturing. *Journal of Cleaner Production*.

- Manrique, S., & Martí-Ballester, C. (2017). Analyzing the Effect of Corporate Environmental Performance on Corporate Financial Performance in Developed and Developing Countries. *Sustainability*.

- Mustafa, M. S., & Taqi, M. (2017). A Study on the Financial Performance Evaluation of Punjab National Bank. *International Journal of Business and Management Invention,6*(1), 05-15.

- Baran, D., Pastyr, A., & Baranova, D. (2016). Financial Analysis of a Selected Company. *Research Papers Faculty of Materials Science and Technology Slovak University of Technology,24*(37), 73-92.

- Teker, S., Teker, D., & Guner, A. (2016). Financial Performance of Top 20 Airlines. *Procedia Social and Behavioral Sciences,*603-610.

- Friede, G., Busch, T., & Bassen, A. (2015). ESG and financial performance: Aggregated evidence from more than 2000 empirical studies. *Journal of Sustainable Finance & Investment,5*, 210-233.

- Wahba, H., & Elsayed, K.(2015). The mediating effect of financial performance on the relationship between social responsibility and ownership structure. *Future Business Journal,1* (2), 1-12.

- Nagarkar, J. J. (2015). Analysis of Financial Performance of Banks in India. *National Journal of Symbiosis Centre for Management Studies*,*3*, 26-37.

- Karri, H., Meghani, K., & Mishra, B. (2015). A Comparative Study on Financial Performance of Public Sector Banks in India: An Analysis on Camel Model. *Munich Personal RePEc Archive*, *4*(8), 18-34.

- Kassar, T. A., & Soileau, J. S. (2014). Financial performance evaluation and bankruptcy prediction (failure) 1. *Arab Economic and Business Journal*,*9*(2), 147-155.

- I., Latasri, O., Manjula, N., & Banu, A. M. (2014). A Study on Financial Performance of Ashok Leyland Limited at Chennai. *IOSR Journal of Business and Management,16*(6), 83-89.

- Sultan, A. S. (2014). Financial Statements Analysis-Measurement of Performance and Profitability: Applied Study of Baghdad Soft-Drink Industry. *Research Journal of Finance and Accounting*, 5(4).

- Alfonso, O., & Villegas, J. B. (2014). The financial performance of an innovative megaproject. *Procedia - Social and Behavioral Sciences,*417-426.

- Islam, M. A. (2014). An Analysis of the Financial Performance of National Bank Limited Using Financial Ratio. *Journal of Behavioural Economics, Finance, Entrepreneurship, Accounting and Transport,2*(5), 121-129.

- Geetha, T., & Ramasamy, S. (2014). A Study on the Financial Performance Efficiency of Selected Cement Industries in India. *International Journal of Emerging Engineering Research and Technology,2*(3), 106-111.

- Nairn-Birch, N., & Etzion, D. (2013). Triangulating environmental performance: What do corporate social responsibility ratings really capture? *Academy of Management Perspectives,27*.

- Moldan, B., & Hak, T. (2012). How to understand and measure environmental sustainability: Indicators and targets. *Ecological Indicators,17*, 4-13.

- Tandon, P., & Singh, A. (2012). A Study of Financial Performance: A Comparative analysis of SBI and ICICI bank. *International Journal of Marketing, Financial Services & Management Research,1*(11), 56-71.

- Nairn-Birch, N. S., & Delmas, M. A. (2011). Is the tail wagging the dog?An empirical analysis of corporate carbon footprints and financial performance. *UCLA: Institute of the Environment and Sustainability*.

- Agarwal, P. K., & Sinha, S.K. (2010). Financial performance of microfinance institutions of India .*Delhi Business Review*,11(2), 37-46.

- Henri, J. F., & Journeault, M. (2008). Environmental performance indicators: An empirical study of Canadian manufacturing firms. *Journal of Environmental Management,87*(1), 165-176.

- King, A., & Lenox, M. (2001). Does it Really Pay to be Green? An Empirical Study of Firm Environmental and Financial Performance. *Journal of Industrial Ecology,5*(1).

- Ren, X. (2000). Development of environmental performance indicators for textile process and product. *Journal of Cleaner Production,8*(6), 473-481.